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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/798,305	03/12/2004	Takahiro Kume	742158-9	5795

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WASHINGTON, DC 20004-2128

EXAMINER

CHANG, VICTOR S

ART UNIT	PAPER NUMBER
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1771

DATE MAILED: 01/20/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

10/798,305

Applicant(s)

KUME ET AL.

Examiner

Victor S. Chang

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 28 November 2005 and 04 January 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) 4-8 and 10-20 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-3 and 9 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 12 March 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
- 1) ☒ Certified copies of the priority documents have been received.
  - 2) ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - 3) ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date 3/12/04.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

## **DETAILED ACTION**

### ***Election/Restrictions***

1. First, Applicants election of Group I (claims 1-14) without traverse in a response dated 11/28/2005 has been entered.
2. Second, Applicant's election with traverse of species 1-3 and 9 in the reply filed on 1/4/2006 is acknowledged. The traversal is on the ground(s) that "... all the claims 2-14 are either directly or indirectly dependent upon elected claim 1 ... claim 1 is generic, and that the allowance of claim 1 would mandate the examination of the non-elected species claims 4-8 and 10-14." This is not found persuasive because claims 4-8 and 10-14 are structurally distinct and patentably independent as a whole in each identified species as set forth in the Office action mailed 10/28/2005. For example, claim 1 lacks an "elastic layer" as an essential structural element of claim 4, which renders claim 4 structurally distinct and patentably independent. In summary, claims 1-3 and 9 are elected. Claims 4-8 and 10-20 are withdrawn.

The requirement is still deemed proper and is therefore made FINAL.

### ***Claim Rejections - 35 USC § 112***

2. Claims 1-3 and 9 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The claims are generally narrative and indefinite, failing to conform with current U.S. practice. They appear to be a literal translation into English from a foreign document and are replete with grammatical and idiomatic errors.

First, in claim 1, the phrase “elastic plastic foam sheet” appears to be vague, indefinite and confusing. It is not clear whether Applicants are claiming a foam sheet formed by an elastic or plastic material, or what material property is being claimed. Second, at line 3, the use of the term “inside” for setting forth the structural relationship between the “polishing layer” and “surface layer” also appears to be vague, indefinite, and incommensurate with the structure shown in Fig. 1, in which the “polishing sheet (layer) 2” is disposed over the “surface layer”, not “inside” as recited (see specification, paragraph 0027 and Fig. 6). Third, at line 4, it is vague and indefinite what is the term “whose” (presumably it is the “polishing layer”) being directed to, “surface layer” or “polishing layer”? Fourth, at line 7, similarly, it is vague and indefinite what is the term “whose” (presumably it is the “polishing layer”) being directed to, “surface layer” or “polishing layer”? Fifth, at line 8, please clarify the term “which” (presumably to be directed to the term “space volume”). Sixth, at lines 9-10, the phrase “... diameter is smaller than that of the space volume” is again vague, indefinite and confusing, it is unclear how a “diameter” (linear dimension) can be compared to a “space volume”. Clarifications and corrections are requested.

***Claim Rejections - 35 USC § 102***

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3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

***Claim Rejections - 35 USC § 103***

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. Claims 1-3 and 9 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over JP 10-249709 (abstract), and as evidenced by Applicants' admission.

JP '709 is directed to abrasive cloth (polishing sheet) having a urethane resin film of a vertical foam structure (foam with grooves, see Figure) formed by uniformly coating a flat sheet with a urethane resin liquid, then solidifying (coagulating) the liquid by a wet solidification method. Further, JP '709 expressly teaches that the vertical foam structure is homogeneous, i.e., uniform (abstract).

JP '709 is silent about the formation of a skin layer, the thickness of the polishing layer, and the porous structure relations within and between the skin layer and the polishing layer. However, it is noted that Applicants admitted that conventional wet film forming process a skin layer is formed, and the coagulation liquid enters into an interior

of the resin emulsion from portions where the coagulation liquid is easy to enter at the skin layer, i.e., pores are communicated (specification, paragraph 0039). As such, since JP '709 teaches that same subject matter (a polishing pad), formed by the same process (wet coagulating process), and for the same application, in the absence of evidence to the contrary, it is the Examiner's position that the aforementioned limitations are either anticipated by JP '709, or obviously provided by practicing the invention of prior art.

Claims lack novelty.

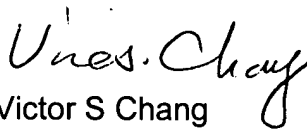
### ***Conclusion***

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Victor S. Chang whose telephone number is 571-272-1474. The examiner can normally be reached on 8:30 - 5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Terrel H. Morris can be reached on 571-272-1478. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

  
Victor S Chang  
Examiner  
Art Unit 1771

1/13/2006